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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/724,235	12/01/2003	Jae Cheol Lyu	K-103B	8759
34610	7590	09/12/2006	EXAMINER	
FLESHNER & KIM, LLP P.O. BOX 221200 CHANTILLY, VA 20153			STINSON, FRANKIE L	
			ART UNIT	PAPER NUMBER

1746

DATE MAILED: 09/12/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/724,235

Applicant(s)

LYU ET AL.

Examiner

FRANKIE L. STINSON

Art Unit

1746

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 24 July 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 7-24-06

- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

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1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-4, 6 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Singh et al. (U. S. Pat. No. 5,150,588) in view of either Smith (U. S. Pat. No. 2,575,689) or Cornelius (U. S. Pat. No. 3,740,975).

Re claim 1, Singh is cited disclosing a washing machine, comprising:

an outer tub (28) configured to store washing water; an inner tub rotatably mounted in the outer tub;

a pulsator (30, see col. 4, line 60- col. 5, line 3) configured to form a water circulation for washing laundry; and

a motor (44) installed under the outer tub and configured to rotate the inner tub and the pulsator, wherein the motor is configured to vary a rotation speed of the inner tub and the pulsator, such that the laundry is washed by a combination of modes as follows:

a centrifugal force washing mode (see col. 4, lines 39-59), wherein the motor rotates the inner tub and the pulsator in the same direction for a first predetermined period of time, thereby creating a centrifugal force that is varied according to a variation of the rotation speed, which pushes the laundry against a wall of the inner tub;

and an agitation washing mode (col. 4, lines 60-65), wherein the motor rotates the inner tub and the pulsator in the same direction at an identical speed, and then

rotates the inner tub and pulsator in a first direction for a second period of time and then in a second, reverse direction for the second period of time. That differs from the claim only in the recitation of the predetermined period of time. The patents to Smith (col. 3, lines 61-66) and Cornelius (col. 7 line 48 thru col. 8, line 6) disclose the predetermined period of time as claimed. It therefore would have been obvious to one having ordinary skill in the art to modify the device of Singh, to have the pulsator an inner tub rotated at a predetermined of time as taught by either Smith or Cornelius, for the purpose of effecting proper agitation for soil removal. Re claim 2, Singh discloses the water flow as claimed. Re claim 3, Cornelius discloses the restoration washing mode as claimed (col. 9, lines 16-38). Re claim 4, Cornelius discloses the restoration mode (col. 8, lines 7- 38, particularly, lines 25-32). Re claim 6 and 7, no patentable distinction is deemed to exist between the predetermined period of time and speed as claimed and the corresponding period and speed as taught by either Smith or Cornelius. Claims directed to apparatus must be distinguished from the prior art in terms of structure rather than function. *In re Danly*, 263 F.2d 844, 847, 120 USPQ 528, 531 (CCPA 1959). “[A]pparatus claims cover what a device is, not what a device does.”

*Hewlett-Packard Co. v. Bausch & Lomb Inc.*, 909 F.2d 1464, 1469, 15 USPQ2d 1525, 1528 (Fed. Cir. 1990). (emphasis in original).

3. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over the applied prior art as applied to claim 1 above, and further in view of Koo et al. (U. S. Pat. No. 5,842,358).

Claim 5 defines over the applied prior art only in the recitation of the rotor surrounding the stator. Koo is cited disclosing the arrangement as claimed. It therefore would have been obvious to one having ordinary skill in the art to modify the motor of Singh, to have the motor to be as taught by Koo, since this is considered to be a mere substitution of equivalents.

4. Applicant's arguments with respect to the pending claims have been considered but are moot in view of the new ground(s) of rejection.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to FRANKIE L. STINSON whose telephone number is (571) 272-1308. The examiner can normally be reached on M-F from 5:30 am to 2:00 pm and some Saturdays from approximately 5:30 am to 11:30 am.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Barr, can be reached on (571) 272-1700. The fax phone number for the organization where this application or proceeding is assigned is 571-272-8300.


Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only.

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For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

fls



FRANKIE L. STINSON  
Primary Examiner  
GROUP ART UNIT 1746